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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/735,542	12/14/2000	Paul G. Wilson	13551	6558

293 7590 12/11/2007  
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EXAMINER
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ART UNIT	PAPER NUMBER
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2616

MAIL DATE	DELIVERY MODE
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12/11/2007

PAPER

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BEFORE THE BOARD OF PATENT APPEALS  
AND INTERFERENCES

Application Number: 09/735,542  
Filing Date: December 14, 2000  
Appellant(s): WILSON ET AL.

Ralph A. Dowell  
For Appellant

EXAMINER'S ANSWER

**MAILED**

DEC 11 2007

**GROUP 2600**

This is in response to the appeal brief filed 8/31/07  
appealing from the Office action mailed 3/16/07.

**(1) Real Party in Interest**

A statement identifying by name the real party in interest is contained in the brief.

**(2) Related Appeals and Interferences**

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

**(3) Status of Claims**

The statement of the status of claims contained in the brief is correct.

**(4) Status of Amendments After Final**

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

**(5) Summary of Claimed Subject Matter**

The summary of claimed subject matter contained in the brief is correct.

**(6) Grounds of Rejection to be Reviewed on Appeal**

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

**(7) Claims Appendix**

The copy of the appealed claims contained in the Appendix to the brief is correct.

**(8) Evidence Relied Upon**

6,980,515	Schunk et al.	12-2005
6,516,059	Shaffer et al.	2-2003

**(9) Grounds of Rejection**

The following ground(s) of rejection are applicable to the appealed claims:

A. Claims 1, 3-4, 6, 9-17, 19-20, 22, 26-27, and 29-31 are rejected under 35 U.S.C. 102(e) as being anticipated by Schunk et al. (6,980,515).

Regarding claims 1, 3, 13-15, 20, 22, 26-27, and 29-31:

Schunk et al. disclose a multi-service gateway, comprising; means for receiving a connection request; means for determining a usage level of resources in a resource pool in the multi-service gateway; and means for allocating resources from the

resource pool to satisfy the connection request if the usage level of the pool is below an occupancy threshold (the abstract recite providing resource for access to the multi-service network being determined by the call's QoA level of the connection request and current resource usage; col. 18 lines 53-61 recite the resource pool and updating status of the resource pool), otherwise

determining a priority level of the connection request and allocating resources from the pool to satisfy the connection request only if the priority level of the connection request is higher than a priority threshold as in claims 1, 20-22, 27, 29-31; and receiving the connection request prior to allocating resources from the resource pool as in claim 3 (Fig. 13 and the example of col. 15 line 58 to col. 16 line 40 shows and recites the access threshold associated 330 with the QoA level 328, whereby if the system resource usage is 50 percent or less, then Users 1, 2, and 3 remain connected and if the resource utilization exceed the access threshold 330 corresponding to the user's QoA level 328 then the new connection request is refused; the abstract recites tiered access to the system resources; col. 31 lines 23-25 recite first tier connection requests being automatically allocated; col. 15 line 58 to col. 16 line 40

recite new users in the same QoA level are not permitted access to system resource until more resources become available; further, col. 1 line 66 to col. 2 line 10 and col. 8 line 58 to col. 9 line 2 recite the use of quality of access QoA levels to prioritize connection requests when there is competition for resources whereby connection request with a higher QoS level is given priority over a lower QoA level) as in claims 1, 3, 13-15, 20, 22, 26-27, and 29-31.

Regarding claim 4:

Schunk et al. disclose receiving the connection request from a connection server/broker prior to allocating resources from the resource pool (see col. 3 lines 49-59 which recite the route server which performs the functions of the forwarding module).

Regarding claims 6, 9:

Schunk et al. disclose wherein the priority level of the connection request is a function of the type of traffic carried by the requested connection and wherein each connection request is associated to a type of traffic selected from the group consisting of originating, terminating, feature and progress (see col. 2 lines 11-21 which recite the connection request being assigned a QoA based on the inlink type of the call which

clearly anticipate the type of traffic selected from the group consisting of originating, terminating, feature and progress).

Regarding claim 10:

Schunk et al. disclose wherein the priority level of progress traffic is greater than the priority level of feature traffic, which is greater than the priority level of terminating traffic, which is greater than the priority level of originating traffic (col. 15 line 58 to col. 16 line 40 which recite that new users in the same QoA level are not permitted access to system resource until more resources become available clearly reads on the priority level of progress traffic being greater than the priority level of feature traffic, which is greater than the priority level of terminating traffic, which is greater than the priority level of originating traffic) as in claim 10.

Regarding claims 11-12:

Schunk et al. disclose wherein the processing resources are software resources for processing packets (see col. 8 lines 17-34 which recite the software resources needed for the connection) as in claim 11 and wherein the processing resources are port processing resources (see col. 23 lines 19-28 which recite processing ports for the connection) as in claim 12.

Regarding claims 16-17:

Schunk et al. disclose that if no processing resources are allocated to satisfy the connection request, blocking the connection request as in claim 16 and reporting blockage of the connection request to a connection server/broker as in claim 17 (see col. 1 lines 51-55 which recite that due to user traffic and lack of resources, customer access may be refused and customer gets a busy signal and col. 4 lines 18-30 which recite the use of the digital modem server for providing access).

Regarding claim 19:

Schunk et al. disclose selecting the pool occupancy threshold to achieve a probability of blocking that is less than a pre-determined value (see col. 15 lines 34-43 which recite achieving a higher probability of connection for the higher priority service level access and col. 15 line 64 to col. 16 line 10 which recite associating an access threshold with each QoA level and if resource utilization exceeds the threshold corresponding to the QoA level the request is refused whereby system resources become limiting once threshold reaches 25 percent clearly anticipate selecting pool occupancy threshold to achieve blocking less than a pre-determined value).



B. Claims 18, 23-25, and 28 are rejected under 35 U.S.C. 103(a) as being unpatentable over Schunk et al. (6,980,515) in view of Shaffer et al. (6,516,059).

Regarding claims 24-25:

Schunk et al. disclose use of a time-division multiplexed (TDM) format as in claim 24; and use of an asynchronous transfer mode (ATM) format or an Internet Protocol (IP) format as in claim 25 (see col. 4 lines 52-64 which use the use of TMD busses and ATM busses on the switch's backplane).

Regarding claims 18, 23, and 28:

Schunk et al. disclose the method and device described in paragraph 4 of this office action. Schunk et al disclose all the subject matter of the claimed invention with the exception of wherein each PPSE has the capability to perform conversion of a signal from a circuit-switched format to a packet-switched format as in claim 23; and a plurality of circuit-switched ports and a set of circuit-switched connection resources, wherein the resource manager is further adapted to determine whether circuit-switched connection resources are required to satisfy the connection request and, if circuit-switched connection resources are required to satisfy the connection request,

setting a cross-connect mapping for controlling the circuit-switched connection resources as in claims 18, 28.

Shaffer et al. from the same or similar fields of endeavor teach that it is known to provide wherein each PPSE has the capability to perform conversion of a signal from a circuit-switched format to a packet-switched format (see col. 4 lines 18-30 which recite the gateway translating signals from a packet-switched format to a circuit-switched format reads on conversion of a signal from a circuit-switched format to a packet-switched format) as in claim 23; and a plurality of circuit-switched ports and a set of circuit-switched connection resources, wherein the resource manager is further adapted to determine whether circuit-switched connection resources are required to satisfy the connection request and, if circuit-switched connection resources are required to satisfy the connection request, setting a cross-connect mapping for controlling the circuit-switched connection resources (see abstract which recite allocating resource to support call-related features includes determining resource availability and col. 3 line 53 to col. 4 line 5 which recite load sharing including transfer of data over telephone network clearly reads

on connecting and controlling the circuit-switched connection resources) as in claims 18, 28.

Thus, it would have been obvious to the person having ordinary skill in the art at the time the invention was made to provide the capability to perform conversion of a signal from a circuit-switched format to a packet-switched format; and a plurality of circuit-switched ports and a set of circuit-switched connection resources, wherein the resource manager is further adapted to determine whether circuit-switched connection resources are required to satisfy the connection request and, if circuit-switched connection resources are required to satisfy the connection request, setting a cross-connect mapping for controlling the circuit-switched connection resources as taught by Shaffer et al. in the communications method and gateway of Schunk et al.

The capability to perform conversion of a signal from a circuit-switched format to a packet-switched format; and a plurality of circuit-switched ports and a set of circuit-switched connection resources, wherein the resource manager is further adapted to determine whether circuit-switched connection resources are required to satisfy the connection request and, if circuit-switched connection resources are required to satisfy

the connection request, setting a cross-connect mapping for controlling the circuit-switched connection resources can be implemented by connecting the circuit-switched format to packet-switched format converter and circuit-switched network of Shaffer et al. to multi-service network switch of Schunk et al. The motivation for using the circuit-switched format to packet-switched format converter and circuit-switched network as taught by Shaffer et al. in the communication method and gateway of Schunk et al. being that it provides the desirable added feature of providing both circuit-switching and packet-switching to the multi-service network of Schunk et al.

**(10) Response to Argument**

Applicant argued in pages 7-12 and 13-18 of the appeal brief that the prior art does not teach or suggest processing a request for a connection through a multi-service gateway that comprises determining a priority level of the connection request and if a usage level of a resource pool is not below an occupancy threshold "allocating resources from the resource pool to satisfy the connection request Only if the priority level of the connection request is higher than a priority threshold" is not persuasive because Fig. 15 shows and col. 16 lines 66 to

col. 17 line 57 recite the resource table maintained by the resource manager whereby that if the current resources available is 29 modems, which corresponds to the predetermined level, then connection request with priority levels or QoA levels of 1 to 4 will be allocated resources from the resource pool as shown in the example of Fig. 15, see items 352 and 354; however if the current resources available is only 10 modems then connection request with priority levels 1 and 2 will be allocated the resources because 10 is higher than 0 or 8, but connection request with priority levels of 3 and 4 will not be allocated the resource because 10 is not higher than 16 or 24, clearly anticipate the step of allocating resources from the resource pool to satisfy the connection request only if the priority level of the connection request is higher than a pre-determined level.

Applicant argued in pages 12-13 of the appeal brief that the prior art does not teach or suggest selecting the pool occupancy threshold to achieve a probability of blocking that is less than a pre-determined value because the threshold corresponding to the QoA level refer to percentages of utilization of a set of modems and not a probability of blocking is not persuasive because base upon the QoA level of a call and

percentage of utilization of resources whether to allocated the resource clearly reads on selecting threshold to achieve a probability of blocked calls as in claim 19.

**(11) Related Proceeding(s) Appendix**

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

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SH

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